

**DOCKET NO.: MSFT-2756/302351.01**

**PATENT**

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

**In Re Application of:**

**David B. Lomet, Roger S. Barga**

**Confirmation No.: Not Yet Assigned**

**Application No.: Herewith**

**Group Art Unit: Not Yet Assigned**

**Filing Date: Herewith**

**Examiner: Not Yet Assigned**

**For: OPTIMIZED RECOVERY LOGGING**

**EXPRESS MAIL LABEL NO: EL970385965US**

**DATE OF DEPOSIT: November 24, 2003**

Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

Dear Sir:

**INFORMATION DISCLOSURE STATEMENT**

Pursuant to 37 CFR § 1.56 and in accordance with 37 CFR §§ 1.97-1.98, information relating to the above-identified application is hereby disclosed. Inclusion of information in this statement is not to be construed as an admission that this information is material as that term is defined in 37 CFR § 1.56(b).

- ☒ In accordance with § 1.97(b), since this Information Disclosure Statement is being filed either within three months of the filing date of the above-identified application, within three months of the date of entry into the national stage of the above identified application as set forth in § 1.491, before the mailing date of a first Office Action on the merits of the above-identified application, or

before the mailing date of a first Office Action after the filing of request for continued examination under § 1.114, no additional fee is required.

- ☐ In accordance with § 1.129(a), this Information Disclosure Statement is being filed in connection with ☐ the first or ☐ second After Final Submission, therefore:

☐ Certification in Accordance with § 1.97(e) is attached; or

☐ The fee of \$180.00 as set forth in § 1.17(p) is attached.

- ☐ In accordance with § 1.97(c), this Information Disclosure Statement is being filed after the period set forth in § 1.97(b) above but before the mailing date of either a Final Action under § 1.113 or a Notice of Allowance under § 1.311, or before an action that otherwise closes prosecution in the application, therefore:

☐ Certification in Accordance with § 1.97(e) is attached;  
or

☐ The fee of \$180.00 as set forth in § 1.17(p) is attached.

- ☐ In accordance with § 1.97(d), this Information Disclosure Statement is being filed after the mailing date of either a Final Action under § 1.113 or a Notice of Allowance under § 1.311 but before, or simultaneously with, the payment of the Issue Fee, therefore included are: Certification in Accordance with § 1.97(e); and the submission fee of \$180.00 as set forth in § 1.17(p).

- ☒ Copies of each of the references listed on the attached Form PTO-1449 are enclosed herewith.
- ☐ Copies of references listed on the attached Form PTO-1449 are enclosed herewith
- ☐ Copies of references listed on the attached Form PTO 1449 are not required to be submitted pursuant to the June 30, 2003 recent revisions to 37 CFR § 1.98(a)(2)(i).


EXCEPT THAT:

- ☐ In view of the voluminous nature of references [list as appropriate], and the likelihood that these references are available to the Examiner, copies are not enclosed herewith.
- ☐ In accordance with § 1.98(d), copies of the following references listed on the attached Form PTO-1449 are not enclosed herewith because they were previously cited by or submitted to the U.S. Patent and Trademark Office in patent application(s) for which a claim for priority under 35 U.S.C. § 120 have been made in the instant application:
- ☐ Copies of references [list as appropriate] listed on the attached Form PTO-1449 were previously cited by or submitted to the Patent and Trademark Office in prior Application No. , filed .

Please charge any deficiency or credit any overpayment to Deposit Account No. 23-3050. This form is submitted in duplicate.

There are no listed references which are not in the English language.

Date: **November 24, 2003**

  
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<b>Form PTO-1449 Modified</b>  List of Patent and Publications Cited by Applicant (Use several sheets if necessary)  U.S. Department of Commerce Patent and Trademark Office	Docket No. <b>MSFT-2756/302351.01</b>	Application No. <b>Herewith</b>
	Applicant <b>David B. Lomet, Roger S. Barga</b>	
	Filing Date <b>Herewith</b>	Group <b>Not Yet Assigned</b>
<b>OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)</b>		
	<b>1</b>	Barga, R. et al., "Persistent Applications via Automatic Recovery", <i>IDEAS Conference, July 2003</i> , 10 pages
	<b>2</b>	Barga, R.S., "Phoenix Application Recovery Project", <i>Bulletin of the IEEE Computer Society Technical Committee on Data Engineering, December 2002</i> , 1-6
	<b>3</b>	Barga, R. et al., "Phoenix Project: Fault-Tolerant Applications", <i>SIGMOD Record 31, June 2002</i> , 94-100
	<b>4</b>	Barga, R. et al., "Recovery Guarantees for General Multi-Tier Applications", <i>ICDE Conference, San Jose, Ca, March 2002</i> , 543-554
	<b>5</b>	Barga, R.S. et al., "Persistent Client-Server Database Sessions", <i>EDBT Conference, Lake Constance, Germany, March 2000</i> , 462-477
	<b>6</b>	Barga, R. et al., "Phoenix: Making Applications Robust", <i>SIGMOD Conference, Philadelphia, Pa., June 1999</i> , 562-564
	<b>7</b>	Lomet, D.B., "High Speed On-Line Backup when using Logical Log Operations", <i>SIGMOD Conference Dallas, TX, May 2000</i> , 7 pages
	<b>8</b>	Lomet, D. et al., "A Theory of Redo Recovery", <i>SIGMOD Conference, San Diego, Ca., June 2003</i> , 10 pages
	<b>9</b>	Lomet, D. et al., "Efficient Transparent Application Recovery In Client-Server Information Systems", <i>SIGMOD Conference, Seattle Wa., June 1998</i> , 1-23
<b>EXAMINER</b>		<b>DATE CONSIDERED</b>

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<b>OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)</b>		
10	Lomet, D., "Application Recovery : Advances Toward an Elusive Goal", <i>HPTS Workshop, Asilomer, Ca., September 1997</i> , 1-4	
11	Lomet, D., "Persistent Applications Using Generalized Redo Recovery", <i>ICDE Conference, Orlando, Fla., February 1998</i> , 154-163	
12	Lomet, D.B., "MLR: A Recovery Method for Multi-level Systems", <i>SIGMOD Conference, June 1992</i> , 185-194	
13	Lomet, D. et al., "Redo Recovery after System Crashes", <i>Proceedings of the 21<sup>st</sup> VLDB Conference, September 1995</i> , 457-468	
14	Lomet, D. et al., "Logical Logging to Extend Recovery to New Domains", <i>SIGMOD, 1999</i> , 73-84	
15	Randell, B., "System Structure for Software Fault Tolerance", <i>IEEE Transactions. on Software Eng., June 1975</i> , SE-1, 2, 220-232	
16	Shegalov, G. et al., "EOS: Exactly-Once E-Service Middleware", <i>Proceedings of the 28<sup>th</sup> VLDB Conference, Hong Kong, China, August 2002</i> , 4 pages	
17	Weikum, G., "A Theoretical Foundation of Multi-Level Concurrency Control", <i>PODS Conference, 1986</i> , 31-42	
<b>EXAMINER</b>		<b>DATE CONSIDERED</b>